UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/673,020	09/25/2003	Quan Vu	SONY-26000	9530
Jonathan O. Ow	7590 06/18/200 /ens	EXAMINER		
HAVERSTOCK & OWENS LLP			CHEA, PHILIP J	
162 North Wolfe Road Sunnyvale, CA 94806			ART UNIT	PAPER NUMBER
			2453	
			MAIL DATE	DELIVERY MODE
			06/18/2009	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

		Application No.	Applicant(s)				
Office Action Summary		10/673,020	VU ET AL.				
		Examiner	Art Unit				
		PHILIP J. CHEA	2453				
Period fo	The MAILING DATE of this communication or Reply	appears on the cover sheet	vith the correspondence addre	)ss			
A SH WHIC - Exter after - If NC - Failu Any r	ORTENED STATUTORY PERIOD FOR RECHEVER IS LONGER, FROM THE MAILING asions of time may be available under the provisions of 37 CF SIX (6) MONTHS from the mailing date of this communication period for reply is specified above, the maximum statutory pere to reply within the set or extended period for reply will, by sieply received by the Office later than three months after the nead patent term adjustment. See 37 CFR 1.704(b).	G DATE OF THIS COMMUN R 1.136(a). In no event, however, may a n. eriod will apply and will expire SIX (6) MC tatute, cause the application to become a	IICATION.  The reply be timely filed  ENTHS from the mailing date of this commentation (35 U.S.C. § 133).				
Status							
	Responsive to communication(s) filed on 2	20 April 2000					
2a)□		This action is non-final.					
3)□	<i>'—</i>		tters prosecution as to the m	erits is			
الله ال	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.						
Dispositi	on of Claims	•					
· · ·		-47 is/are pending in the apr	dication				
	Claim(s) <u>1,3-10,12-19,21-28,30-37 and 39-47</u> is/are pending in the application.  4a) Of the above claim(s) is/are withdrawn from consideration.						
	Claim(s) is/are allowed.						
'=	6)⊠ Claim(s) <u></u> is/are allowed. 6)⊠ Claim(s) <u>1,3-10,12-19,21-28,30-37 and 39-47</u> is/are rejected.						
-	Claim(s) is/are objected to.	<u>-77</u> 107410 10300004.					
	Claim(s) are subject to restriction ar	nd/or election requirement.					
·	on Papers						
,	The specification is objected to by the Exam		a buttha Evansinan				
10)	The drawing(s) filed on is/are: a)	· · · · · · · · · · · · · · · · · · ·	-				
	Applicant may not request that any objection to	<del>-</del> · · ·	, ,	4.4047.15			
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).							
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.							
Priority ι	ınder 35 U.S.C. § 119						
<ul> <li>12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).</li> <li>a) All b) Some * c) None of: <ol> <li>Certified copies of the priority documents have been received.</li> <li>Certified copies of the priority documents have been received in Application No</li> <li>Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> </ol> </li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>							
2)  Notic 3) Inform	t(s) e of References Cited (PTO-892) e of Draftsperson's Patent Drawing Review (PTO-948 nation Disclosure Statement(s) (PTO/SB/08) r No(s)/Mail Date <u>5/19/09</u> .	) Paper No	r Summary (PTO-413) o(s)/Mail Date · Informal Patent Application 				

Application/Control Number: 10/673,020 Page 2

Art Unit: 2453

## **DETAILED ACTION**

This Office Action is in response to an Amendment filed April 29, 2009. Claims 1,3-10,12-19,21-28,30-37,39-47 are currently pending. Any rejection not set forth below has been overcome by the current Amendment.

## Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 1,3-6,10,12-15,19,21-24,28,30-33,39-42,44-46 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tischer (US 7,404,142), and further in view of Eldering et al. (US 2005/0283797), herein referred to as Eldering.

As per claims 28,1, Tischer discloses a network comprising:

one or more network devices (see Fig. 1, showing one or more network devices connected to network [150]); and

a first network device coupled to the one or more other network devices (see Fig. 1 [164] showing first network device as server and one or more other network devices [168] as clients), the first network device comprising:

one or more applications (see column 3, lines 40-41, showing one or more applications such as email server and web page server);

a network layer coupled to interface with the one or more other network devices (see column 3, lines 39-40, describing network layer such as Internet, local area network or wide area network);

a communications layer (see column 3, lines 37-39, describing how server communicates with other computing devices over the network implying a communications layer);

an extension layer to provide document type definition extensions to the communications layer, wherein the document type definition extensions define a hierarchical data content structure for the data content (see column 3, lines 54-59, describing document type definitions to define a hierarchical structure for sets of digital content items) and metadata corresponding to the hierarchical data content structure (see column 4, lines 13-20, describing meta data tags to describe the hierarchical data content), further wherein the hierarchical data content structure comprises a plurality of channels to store information (see column 5, lines 14-23, describing channels to store information about the content, such as "Restaurant", "Italian", etc).

Although the system disclosed by Tischer shows substantial features of the claimed invention (discussed above), it fails to disclose that the data content is selectively offered and distributed.

Nonetheless, these features are well known in the art and would have been an obvious modification of the system disclosed by Tischer, as evidenced by Eldering.

In an analogous art, Eldering discloses a subscriber selected ad display and scheduling system which allows subscribers to request any one of a plurality of advertisements they wish to view (see Abstract) Eldering further discloses data content that is organized in a hierarchically that is selectively offered and distributed (see paragraphs 88,89,91, describing categories of advertisements and subcategories i.e. hierarchical data content, that is selectively offered and distributed).

Given the teaching of Eldering, a person having ordinary skill in the art would have readily recognized the desirability and advantages of modifying Tischer by employing data content that is selectively offered and distributed, such as disclosed by Eldering, in order to streamline content desirable by a subscriber.

As per claims 3,12,21,30,39 Tischer further discloses wherein each channel within the plurality of channels includes one or more content sub-channels, wherein each channel within the plurality of channels provides data content of a related subject-matter and each content sub-channel of the one or more content sub-channels within a given channel segments the data content within the given channel according to more specific subject-matter than subject-matter of the given channel (see Tischer column 5,

lines 5-10, showing channels for "restaurant" and sub-channel for "italian", where the "italian" sub-channel is related to a "restaurant" and more specific to the "restaurant' channel).

As per claims 4,13,22,31,40, Tischer further discloses wherein the metadata defines attributes associated with the each channel within the plurality of channels and the content sub-channel of the one or more content-sub-channels within the hierarchical data content structure (see Tischer column 5, lines 5-10, showing metadata tags to define attributes such as "business category" for channel, "restaurant category" for sub-channel, etc).

As per claims 5,14,23,32,41, Tischer further discloses a first data content is associated with a first channel and a first content sub-channel within the first channel (see Tischer column 5, lines 5-10, where first data is "restaurant" and sub-channel is "Italian").

As per claims 6,15,24,33,42, Tischer further discloses that the first data content is associated with the first channel and the first content sub-channel is according to a subject-matter of the first data content, specific subject-matter of the first channel and more specific subject-matter of the first content sub-channel (see Tischer column 5, lines 5-10, showing channels for "restaurant" and sub-channel for "italian", where the "italian" sub-channel is related to a "restaurant" and more specific to the "restaurant" channel).

As per claims 10,19, Tischer in view of Eldering disclose a method of providing data content between a first network device and one or more other network devices, the method comprising:

providing a communications protocol to manage data content exchange between the first network device and the one or more other network devices (see Tischer column 3, lines 54-59, describing document type definitions to define a hierarchical structure for sets of digital content items);

providing document type definition extensions to the communications protocol, wherein the document type definition extensions define a hierarchical data content structure for data content and metadata corresponding to the hierarchical data content structure (see Tischer column 3, lines 54-59, describing document type definitions to define a hierarchical structure for sets of digital content items and Tischer column 4, lines 13-20, describing meta data tags to describe the hierarchical data content);

configuring the hierarchical data content structure into a plurality of channels to store the data content (see Tischer column 5, lines 14-23, describing channels to store information about the content, such as "Restaurant", "Italian", etc), wherein the data content is selectively offered and distributed (see Eldering paragraphs 88,89,91); and

transmitting the data content between the first network device and the one or more other network devices according to the communication protocol and the document type definition extensions to the communications protocol (see Tischer column 3, lines 37-41 and lines 52-59, describing the server providing e-mails, web pages and other data and client computer reading in a structure file according to the document type definition and communication protocol).

As per claim 44, Tischer in view of Eldering disclose a network device coupled to a network of devices, the network device comprising:

one or more applications (see Tischer column 3, lines 40-41, showing one or more applications such as email server and web page server);

a network layer coupled to interface with the one or more other network devices (see Tischer column 3, lines 39-40, describing network layer such as Internet, local area network or wide area network);

a communications layer to provide a communication protocol to manage data content exchange between the network device and the one or more network devices (see Tischer column 3, lines 54-59, describing document type definitions to define a hierarchical structure for sets of digital content items);

an extension layer to provide document type definition extensions to the communications layer, wherein the document type definition extensions define a hierarchical data content structure for the data content (see Tischer column 3, lines 54-59, describing document type definitions to define a hierarchical structure for sets of digital content items) and metadata corresponding to the hierarchical data content structure (see Tischer column 4, lines 13-20, describing meta data tags to describe the hierarchical data content), further wherein the hierarchical data content structure comprises a plurality of channels to store the data content (see Tischer column 5, lines 14-23, describing channels to store information about the

content, such as "Restaurant", "Italian", etc), wherein the data content is selectively offered and distributed (see Eldering paragraphs 88,89,91), wherein each channel within the plurality of channels includes one or more content sub-channels, wherein each channel within the plurality of channels provides data content of a related subject-matter and each content sub-channel of the one or more content sub-channels within a given channel segments the data content within the given channel according to more specific subject-matter than subject-matter of the given channel (see Tischer column 5, lines 5-10, showing channels for "restaurant" and sub-channel for "italian", where the "italian" sub-channel is related to a "restaurant" and more specific to the "restaurant' channel), wherein the metadata defines attributes of each of the plurality of channels, each of the sub-channels and each of the data content (see Tischer column 5, lines 5-10, showing metadata tags to define attributes such as "business category", "restaurant category", etc).

As per claim 45, Tischer further discloses metadata associated with each channel of the plurality of channels includes a title, a caption, an icon-url, an ice-element and an item-group-id (see column 3, line 63 – column 4, line 9, where the title is "phonebook", a caption is "restaurant" an ice-element is "dtdfile", an item-group-id is "business category", and an icon-url is considered digital content item found in column 4, lines 39-44).

As per claim 46, Tischer further discloses that the metadata associated with each content subchannel includes a title, a caption, a priority, an icon-url, an ice-element and an item-group-id (see column 5, lines 5-10, where a title is "restaurant" a caption is "italian" an ice-element is "xml file" an item-group-id is "business category" and an icon-url is considered digital content item found in column 4, lines 39-44, and priority is considered a preference counter in the DTD that gives priority to a certain category over others based on how many times a user has selected the item see column 10, lines 17-37 and column 10, line 64 – column 11, line 6).

3. Claims 7-9,16-18,25-27,34-37,43,47 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tischer in view of Eldering, and further in view of Han et al. (US 2002/0143819), herein referred to as Han.

As per claims 7,16,25,34, although the system disclosed by Tischer in view of Eldering shows substantial features of the claimed invention (discussed above), it fails to disclose that the communications layer comprises an Information and Content Exchange protocol.

Nonetheless, these features are well known in the art and would have been an obvious modification of the system disclosed by Tischer in view of Eldering, as evidenced by Han.

In an analogous art, Han discloses disseminating Web services and other resources from service and content providers to service consumers and for establishing and implementing a subscription agreement which specifies the terms upon which digital assets are provided to the subscribing customers (see Abstract). Han further discloses that the communications layer comprises an Information and Content Exchange protocol (see paragraph 145).

Given the teaching of Han, a person having ordinary skill in the art would have readily recognized the desirability and advantages of modifying Tischer in view of Eldering by employing a communications protocol such as ICE to manage data content exchange, such as disclosed by Han, in order to conform to the industry-standard of subscriptions and allow not only traditional content but also web services and other kind of dynamically executed services.

As per claims 8,17,26,35, Han further discloses that the Information and Content Exchange protocol includes document type definitions and document type definition extensions provide extensions to the document type definitions of the Information and Content Exchange protocol (see Han paragraph 51, describing service definition data used in order to set up the resources used between the server and client see paragraph 50 and Han also describes in paragraph 147, that the ICE protocol is used to perform a subscription process to subscribe to those resources).

As per claims 9,18,27,36,43, Han further discloses that the document type definition extensions are extensible markup language (XML)-based (see paragraph 51).

As per claim 37, Tischer in view of Eldering in view of Han disclose a network device coupled to a network of devices, the network device comprising:

one or more applications (see Tischer column 3, lines 40-41, *showing one or more applications* such as email server and web page server);

a network layer coupled to interface with the one or more other network devices (see Tischer column 3, lines 39-40, describing network layer such as Internet, local area network or wide area network);

an Information and Content Exchange protocol including document type definitions to manage data content exchange between the network device and the one or more other network devices (see Han paragraph 145, showing how the ICE protocol is used to manage content exchange between content and service providers to consumers); and

extensions to the document type definitions, wherein the document type definition extensions define a hierarchical data content structure for the data content (see Tischer column 3, lines 54-59, describing document type definitions to define a hierarchical structure for sets of digital content items) and metadata corresponding to the hierarchical data content structure (see Tischer column 4, lines 13-20, describing meta data tags to describe the hierarchical data content), further wherein the hierarchical data content structure comprises a plurality of channels to store the data content (see Tischer column 5, lines 14-23, describing channels to store information about the content, such as "Restaurant", "Italian", etc), wherein the data content is selectively offered and distributed (see Eldering paragraphs 88,89,91).

As per claim 47, Tischer discloses that the metadata associated with each data content includes a size, an ice-element and an item-id (see column 7, lines 23-29, describing a style definition applied to the category name for the size of the font and column 6, lines 5-10, showing an ice-element of "xml file" and item-id of "Italian restaurant") and Han discloses metadata including content data of a url (see page 13, Table 1, "url used to access service"). One of ordinary skill in the art would have found it obvious to include a url meta tag in order to locate the particular service offered by the server on the web such as disclosed by Han.

Application/Control Number: 10/673,020 Page 9

Art Unit: 2453

Response to Arguments

4. Applicant's arguments with respect to claims 1,3-10,12-19,21-28,30-37,39-47 have been

considered but are moot in view of the new ground(s) of rejection.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should

be directed to PHILIP J. CHEA whose telephone number is (571)272-3951. The examiner can normally

be reached on M-F 6:30-4:00 (1st Friday Off).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ario

Etienne can be reached on 571-272-4001. The fax phone number for the organization where this

application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application

Information Retrieval (PAIR) system. Status information for published applications may be obtained from

either Private PAIR or Public PAIR. Status information for unpublished applications is available through

Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC)

at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative

or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-

1000.

Philip J Chea Examiner Art Unit 2453

/Philip J Chea/ Examiner, Art Unit 2453

6/16/09